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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/017,701	12/14/2001	Li-Wen Chen	52719.00036	5723

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01/09/2006

MetaEdge Corporation
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EXAMINER

NGUYEN, CINDY

ART UNIT	PAPER NUMBER
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2161

DATE MAILED: 01/09/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/017,701

Applicant(s)

CHEN ET AL.

Examiner

Cindy Nguyen

Art Unit

2171

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 31 October 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-23 and 25-34 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-23, 25-34 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 June 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s) _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 4, 5. 6) ☐ Other: _____

DETAILED ACTION

This is in response to amendments filed 10/31/05.

Applicant's arguments have been considered but are moot in view of the new ground(s) of rejection.

1. Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-4, 11-21, 23, 26, 29 and 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morimoto et al. (US 20020059273) (Morimoto) in view of Du (6732120).

Regarding claim 1, Morimoto discloses: A method, comprising: receiving a first database (paragraph 0025, Morimoto); receiving a first input indicating a criteria (paragraph 0025, Morimoto); ; aggregating together into one or more groupings data from the first database, based at least in part upon a spatial component of the data in accordance with the virtual schema and the first input indicating the criteria (paragraphs 0025, 0026, Morimoto); displaying one or more indicators associated with the one or more groupings on an n-dimensional presentation (paragraph 0025, Morimoto).

However, Morimoto didn't disclose: forming a virtual schema including at least a portion of a dataset included within the first database. On the other hand, Du discloses:

forming a virtual schema including at least a portion of a dataset included within the first database (col. 7, lines 15-49, Du). Thus, at the time invention was made, it would have been obvious to a person of ordinary skill in the art to include forming a virtual schema including at least a portion of a dataset included within the first database in the system of Morimoto as taught by Du. The motivation being to enable the system provide a framework for hierarchical organization of spatial data with database system, the spatial object stored in the table as grouped by predefined space partitioning therefore the number of records to retrieve in response to a browse is substantially reduced.

Regarding claim 2, all the limitations of this claim have been noted in the rejection of claim 1 above. In addition, Morimoto/Du discloses: further comprising: receiving a second input indicating one or more regions (paragraph 0025, Morimoto); storing the second input as a spatial-object Meta data (paragraph 0026, Morimoto); and aggregating the groupings based upon the spatial-object meta data (paragraphs 0025-0026, Morimoto).

Regarding claim 3, all the limitations of this claim have been noted in the rejection of claim 2 above. In addition, Morimoto/Du discloses: further comprising: displaying one or more indicators associated with the one or more groupings in a region associated therewith on an n-dimensional presentation (col. 5, lines 1-28, Du).

Regarding claim 4, all the Limitations of this claim have been noted in the rejection of claim 2 above. In addition, Morimoto/Du discloses: wherein the region

comprises at least one of: a polygon, a circle, a rectangle, an ellipse, and an animal home range (paragraph 0042, Morimoto).

Regarding claim 11, all the limitations of this claim have been noted in the rejection of claim 3 above. In addition, Morimoto/Du discloses: wherein: the n-dimensional presentation comprise a map(0025, Morimoto).

Regarding claim 12, all the limitations of this claim have been noted in the rejection of claim 11 above. In addition, Morimoto/Du discloses: wherein: displaying one or more indicators further comprises: determining an x, y coordinate for each region on the map; displaying at least one indicator associated with the one or more groupings on the map at the x, y coordinate (col. 4, lines 52-67, Du).

Regarding claim 13, all the Limitations of this claim have been noted in the rejection of claim 2 above. In addition, Morimoto/Du discloses: further comprising: receiving a third input indicating a one or more redefined regions; storing the third input as a redefined spatial-object meta data (paragraph 0025, Morimoto); and aggregating into new groupings based upon the spatial-object meta data (col. 8, lines 35-67, Du).

Regarding claim 14, all the Limitations of this claim have been noted in the rejection of claim 2 above. In addition, Morimoto/Du discloses: further comprising: redefining the virtual schema based upon the spatial-object Meta data (col. 8, lines 35 to col. 9, lines 27, Du).

As per claims 15 and 16, all the Limitations of these claims have been noted in the rejection of claims 2 and 3. It is therefore rejected as set forth above.

Regarding claim 17, all the Limitations of this claim have been noted in the rejection of claims 1 and 2 above. It is therefore rejected as set forth above.

Regarding claim 18, all the Limitations of this claim have been noted in the rejection of claim 1 above. In addition, Morimoto/Du discloses further comprising: generating code in accordance with the virtual schema (col. 8, lines 35-54, Du).

Regarding claim 19, all the Limitations of this claim have been noted in the rejection of claim 1 above. In addition, Morimoto/Du discloses further comprising: providing customer centric information to a core of customer data within the database in accordance with the virtual schema (col. 11, lines 53 to col. 12, lines 15, Du).

As per claim 20, all the Limitations of these claims have been noted in the rejection of claims 1 and 2 above. It is therefore rejected as set forth above.

Regarding claim 21, all the limitations of these claims have been noted in the rejection of claims 1 and 2 above. In addition, Morimoto/Du discloses: A system, comprising: a schema builder (col. 8, lines 35-67, Du) that generates one or more virtual schemas (col. 8, lines 35-67, Du) including at least a portion of data input from a

source (0025, Morimoto), and generates mapping rules controlling data movement into a data warehouse (0025, 0026, Morimoto); a metadata repository operative to hold the virtual schemas and mapping rules (col. 6, lines 40-65, Du); a data warehouse builder (0025, 0026, Morimoto); a region checker (0033, Morimoto); a spatial-object data repository (0026, Morimoto) and wherein one or more indicators associated with one or more groupings determined from the at least a portion of data input from a source are displayed on the n-dimensional presentation (0025, 0026, Morimoto).

Regarding claim 23, all the limitations of these claims have been noted in the rejection of claims 1 and 21 above. Therefore it rejected as above.

Regarding claim 26, all the limitations of this claim have been noted in the rejection of claim 1 above. In addition, Morimoto/Du discloses a customer data analysis report produced according to the method of claim 1 (0033, Morimoto).

Regarding claim 29, all the limitations of this claim have been noted in the rejection of claim 1 above. In addition, Morimoto/Du discloses wherein displaying one or more indicators associated with one or more groupings on an n-dimensional presentation comprise: overlaying the one or more indicators on a virtual world presentation (0038, Morimoto).

As per claim 30, all the Limitations of these claims have been noted in the rejection of claim 1. It is therefore rejected as set forth above.

3. Claims 22 and 25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morimoto et al. (US 20020059273) (Morimoto) in view of Du (6732120) and further in view of Agassi et al. (US 6480842) (Agassi).

Regarding claim 22, all the limitations of this claim have been noted in the rejection of claim 21 above. However, Morimoto/Du didn't disclose: wherein the source comprises at least one of a plurality of on line transaction (OLTP) databases. On the other hand, Agassi discloses: wherein the source comprises at least one of a plurality of on line transaction (OLTP) databases (col. 2, lines 60-67, Agassi). Thus, at the time invention was made, it would have been obvious to a person of ordinary skill in the art to include at least one of a plurality of on line transaction (OLTP) databases in the system of Morimoto/Du as taught by Agassi. The motivation being to enable the system allows the user navigate across OLAP and OLTP data structures with a common interface.

Regarding claim 25, all the limitations of these claims have been noted in the rejection of claims 1 and 2 above. In addition, Morimoto/Du discloses:
Morimoto/Du/Agassi discloses: A computer program product, comprising: code for accessing meta data from a repository (col. 2, lines 50-67, Agassi); code for providing customer activity correlation queries with access to a database of a data warehouse (col. 2, lines 2-8, Agassi); code for providing customer data analysis functions (col. 8, lines 38-50, Agassi); code for displaying analysis results to at least one of a plurality of business applications using one or more indicators associated with the one or more groupings on an n-dimensional presentation (col. 5, lines 1-28, Du); and a computer readable storage medium for holding the codes (23, fig. 1, Morimoto); code for

translating entities from a meta model into a data schema to form a database (col. 8, lines 60-67, Agassi). . The motivation being to enable the system allows the user navigate across OLAP and OLTP data structures with a common interface, translating an OLTP request into an OLAP response.

4. Claims 5, 6 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morimoto et al. (US 20020059273) (Morimoto) in view of Du (6732120) and further in view of Michael Gonzales "Seeking spatial intelDugence,<http://intelDugententerprise.com/000120/feat1.shtml> provided by Applicant.

Regarding claim 5, all the limitations of this claim have been noted in the rejection of claim 2 above. However, Morimoto/Du didn't disclose: wherein: the second input indicating one or more regions comprises: at least one of: an input from a user, a pre-determined area, a derivation based upon one or more objects on the n-dimensional presentation, and a result of a computation. On the other hand, Gonzales discloses: pre-determined area (table 1, page 2, Gonzales). Thus, at the time invention was made, it would have been obvious to a person of ordinary skill in the art to include the step for pre-determined area in the combination system of Morimoto/Du as taught by

Gonzales. The motivation being to enable the system maps the spatial entity and presenting spatial data across the organization.

Regarding claim 6, all the limitations of this claim have been noted in the rejection of claim 5 above. In addition, Morimoto/Du/Gonzale discloses: wherein: the pre-determined area comprises at least one of: a zip code, an area code, a census tract, a Metropolitan Statistical Area (MSA), a nation state, a state, a county, a municipality, a latitude, and a longitude (table 1, page 2, Gonzales).

Regarding claim 7, all the limitations of this claim have been noted in the rejection of claim 5 above. In addition, Morimoto/Du/Gonzale discloses: wherein: the derivation based upon one or more objects on the n-dimensional presentation comprises: a region within a specified distance of a power line (distance of location to the warehouse in table 1, page 2, Gonzales).

5. Claims 8-10 and 31-34 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morimoto et al. (US 20020059273) (Morimoto) in view of Du (6732120) and further in view of Michael Gonzales "Seeking spatial intelDugence,<http://intelDugententerprise.com/000120/feat1.shtml> and further in view of Anderson et al. "Coordinates of a Killer-Geospatial solutions" provide by Applicant.

Regarding claim 8, all the limitations of this claim have been noted in the rejection of claim 5 above. However, Morimoto/Du/Gonzale didn't disclose: wherein the result of a computation comprises: computing an animal home range, the home range providing a region defined by activities of a target; defining within the region a first ellipse; and defining within the region a second ellipse approximately orthogonal to the first ellipse; wherein an area defined by intersection of the first ellipse and the second ellipse provides a greatest probability of finding the target. On the other hand, Anderson discloses: wherein the result of a computation comprises: computing an animal home range, the home range providing a region defined by activities of a target; defining within the region a first ellipse; and defining within the region a second ellipse approximately orthogonal to the first ellipse; wherein an area defined by intersection of the first ellipse and the second ellipse provides a greatest probability of finding the target (page 3, paragraphs 3-4, Anderson). Thus, at the time invention was made, it would have been obvious to a person of ordinary skill in the art to include the step for computing the activities of a target within the region as claimed in the combination system of Morimoto/Du/ Gonzales as taught by Anderson. The motivation being to enable the system maps of store and victim locations as well as economic geography theories and showing distance intervals for each store, also using the algorithms to calculate the animal movements (page 3, paragraphs 3-4, Anderson).

Regarding claim 9, all the limitations of this claim have been noted in the rejection of claim 8 above. In addition, Morimoto/Du/Gonzale/Anderson discloses:

wherein: the target comprises at least one of: a suspect, who perpetrated criminal acts defined by the data, a customer, who completed transactions in shops defined by the data, a source of biological material, which caused infections in persons defined by the data (page 3, paragraphs 3-4, Anderson).

Regarding claim 10, all the limitations of this claim have been noted in the rejection of claim 2 above. In addition, Morimoto/Du /Anderson discloses: wherein: aggregating the groupings based upon the spatial-object meta data comprises: checking whether data points fall within a common region, and if so, aggregating data represented by the data points (col. 6, lines 55-65, Du).

Regarding claim 31, all the limitations of this claim have been noted in the rejection of claim 30 above. In addition, Morimoto/Du /Anderson discloses: wherein: associating an indicator with the grouping of data for display of the indicator on an n-dimensional presentation comprises: displaying at least one indicator, the indicator indicating a location and density information determined from the source data (page 3, paragraph 2-4, Anderson).

Regarding claim 32, all the limitations of this claim have been noted in the rejection of claim 21 above. In addition, Morimoto/Du /Anderson discloses: wherein: displaying at least one indicator, the indicator indicating a location and density information determined from the source data comprises: displaying a graphical depiction of the source data, wherein density information is indicated by the graphical depiction (page 3, last paragraph to page 4 1st paragraph, Anderson).

Regarding claim 33, all the limitations of this claim have been noted in the rejection of claim 32 above. In addition, Morimoto/Du /Anderson discloses: wherein displaying a graphical depiction of the source data, wherein density information is indicated by the graphical depiction comprise: displaying a bar graph depiction of source data, wherein the bar graph indicated modifications in response to user input (col. 5, lines 19-28, Du).

Regarding claim 34, all the limitations of this claim have been noted in the rejection of claim 33 above. In addition, Morimoto/Du /Anderson discloses: wherein displaying a bar graph depiction of the source data, wherein the bar graph indicated modifications in response to user input comprises: displaying at least one dot, right arrow, left arrow or word(s) (col. 5, lines 19-38, Du).

6. Claims 27 and 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morimoto et al. (US 20020059273) (Morimoto) in view of Du (6732120) and further in view of Brandt et al. (US 6714979) (Brandt) .

Regarding claims 27 and 28, all the limitations of this claim have been noted in the rejection of claim 2 above. In addition, Morimoto/Du discloses: at least one of a plurality of classification components providing classifications for information relating to the core component (col. 8, lines 10-29, Morimoto). However, Morimoto/Du didn't disclose: a method, a computer readable storage medium containing information organized into a focal group and at least one customized group, comprising: at least one of a plurality of core components; providing at least one customized group, , comprising: at least one of a plurality of customer activity components related to the

core component; at least one of a plurality of activity lookup components related to at least one of the customer activity components; wherein the focal group and the customized group comprise a reverse star schema meta model. On the other hand, Brandt disclose: a method, a computer readable storage medium containing information organized into a focal group and at least one customized group, comprising: at least one of a plurality of core components (col. 18, lines 7-19, Brandt); providing at least one customized group, (col. 23, lines 62 to col. 24, lines 9, Brandt), comprising: at least one of a plurality of customer activity components related to the core component (col. 23, lines 62 to col. 24, lines 9, Brandt); at least one of a plurality of activity lookup components related to at least one of the customer activity components (col. 19, lines 30-41, Brandt); wherein the focal group and the customized group comprise a reverse star schema meta model (col. 18, lines 36-40, Brandt). Thus, at the time invention was made, it would have been obvious to a person of ordinary skill in the art to include the providing steps above in the system of Morimoto/Du as taught by Brandt. The motivation being to enable the system supports customized data access, create aggregates and perform transformation on the data prior to data mart in order to implement a defined data model, as star schema key structures.

7. Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Bakalash et al. (U.S 2002/0029207). Data aggregation server for managing a multi-dimensional database and database management system having data aggregation server integrated therein.

Benedikt et al. (U.S 6202063). Methods and apparatus for generating and using safe constraint queries.

Roccaforte (U.S 6636870). Storing multidimensional data in a relational database management system.

Rosensteel Jr. et al. (U.S 6167405). Method and apparatus for automatically populating a data warehouse system.

Israni et al. (U.S 6308177). System and method for use and storage of geographic data on physical media.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

8. Contact Information

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Cindy Nguyen whose telephone number is 703-305-4698. The examiner can normally be reached on M-F: 8:00-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Safet Metjahic can be reached on 703-308-1436. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9306 for regular communications and 703-872-9306 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-3900.



Cindy Nguyen
December 27, 2005



MOHAMMAD ALI
PRIMARY EXAMINER